

Guatemala

Fundación Solar and Winrock International



55% - 65% of the urban population is electrified.
45% of the rural population is electrified.

Renewable Energy in Guatemala

- There is no explicit policy on rural decentralized energy services or for the role of renewable energy.
- The government of Guatemala is promoting the development of feasibility or pre-feasibility studies for rural grid interconnection and some village electrification using renewable energy.
- The interconnection rate has increased to 50% - 55% of the population, but it is expected that in the rural areas the electrification index may be lower.
- Privatization has spurred significant investment in fossil fuel generation.
- Recent policy developments have not been very supportive of renewable energies, for example; new tax legislation has removed import benefits formerly accorded to imports of renewable energy equipment.
- In Guatemala, privatization has been passed, but it is only part of the equation: a comprehensive energy policy still needs to incorporate all aspects of renewables in the planning equations and support mechanisms for decentralized rural energy services.

- Stand-alone PV systems are the most common technical solution for rural projects.
- Solar PV is economically sensible if communities are 5 km away from the national grid and have less than 100 houses.



- Not all of the people can afford to be farmers: productive uses of RE is a must in Guatemala.
- Scaling up technologies allows for economic gain, as well as for financial profits in small rural businesses.
- Small hydro-electric systems (15-100 kW) are feasible in a country with over 4,000 MW of untapped hydro potential.

- If a village has more than 30 houses, 4 m/s wind speed, and is located 7 km away from the national grid, wind power is the right choice.
- Fuel wood continues to be the main source of energy for cooking in Guatemala.
- Renewable energy is not an ultimate solution in Guatemala, but it is a means to accomplish other social, economic, and environmental goals.

